

DEPARTMENT OF TRANSPORTATION**DIVISION OF ENGINEERING SERVICES**

Office of Structural Materials

Quality Assurance and Source Inspection



Bay Area Branch

690 Walnut Ave.St. 150

Vallejo, CA 94592-1133

(707) 649-5453

(707) 649-5493

Contract #: 04-0120F4Cty: SF/ALA Rte: 80 PM: 13.2/13.9File #: 99.28**WELDING INSPECTION REPORT****Resident Engineer:**Pursell, Gary**Address:** 333 Burma Road**City:** Oakland, CA 94607**Report No:** WIR-001702**Date Inspected:** 07-Mar-2008**Project Name:** SAS Superstructure**OSM Arrival Time:** 830**Prime Contractor:** American Bridge/Fluor Enterprises, a JV**OSM Departure Time:** 1830**Contractor:** Japan Steel Works, Ltd.**Location:** Muroran, Japan

CWI Name:	Chung Kuan and Makhmud Ashadi			CWI Present:	Yes	No
Inspected CWI report:	Yes	No	N/A	Rod Oven in Use:	Yes	No N/A
Electrode to specification:	Yes	No	N/A	Weld Procedures Followed:	Yes	No N/A
Qualified Welders:	Yes	No	N/A	Verified Joint Fit-up:	Yes	No N/A
Approved Drawings:	Yes	No	N/A	Approved WPS:	Yes	No N/A
				Delayed / Cancelled:	Yes	No N/A
Bridge No:	34-0006			Component:	Welder Qualification	

Summary of Items Observed:

On this date OSM Quality Assurance Representative Daniel L. Reyes observed the casting of the cable saddles, welding of the structural steel components and inspection relative to this project. The following was observed:

At the start of the shift this QA inspector observed the Welder Performance Qualification Test (WPQT) and the performance of the Quality Control (QC) Inspectors Chung Kuan and Makhmud Ashadi during the welder performance qualification test of three (3) Japan Steel Works (JSW) personnel. The three (3) individuals were identified as follows; Yuuki-Hayasaka ID-94-2251, Mamoru-Kubota ID-74-3666 and Mutsuo-Kashiwada ID-082008. The welding personnel appeared to utilize the Shielded Metal Arc Welding (SMAW) as per the Welding Procedure Specification (WPS) identified as SJ-2983 WP-1. The QA inspector also observed the electrode size of 4 millimeters and electrode classification appeared to be E9018-M which appears to comply with the contract documents and the test plates are positioned in the vertical plane (3G) with the weld progression upward.

Prior to the start of the welding this QA inspector observed the QC inspectors Chung Kuan and Makhmud Ashadi verify the assembly fit-up and the minimum preheat temperature 160 degrees Celsius which appeared to comply with the WPS. At the conclusion of the welding of the root pass the QC inspectors performed a visual weld inspection prior to any subsequent welding which appeared to comply with the contract documents. The welders continued with the welding of subsequent weld layers at the conclusion of the QC inspector visual inspection of the root pass. The QC inspectors were randomly observed by this QA inspector performing the in process visual weld inspection and monitoring of the interpass temperatures so as not to exceed the maximum temperature of 260 degrees Celsius.

At the conclusion of the testing the QA inspector observed the QC inspectors Mr. Kuan and Mr. Ashadi perform a

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visual weld inspection of the completed test plates. All three (3) JSW personnel failed the visual weld inspection performed by the QC inspectors. The test plates were rejected for failure to meet the minimum weld profile requirements (excessive weld reinforcement and undercut). This QA inspector also noted that the welding personnel Mamoru-Kubota ID 74-3666 failed to complete the test. This QA inspector concurs with the QC inspector's assessment.

Summary of Conversations:

There were general conversations with the Quality Control (QC) Inspectors regarding the Welder Performance Qualification Test and welding personnel.

Comments

This report is for the purpose of determining conformance with the contract documents and is not for the purpose of making repair or fit for purpose recommendations. Should you require recommendations concerning repairs or remedial efforts please contact Venkatesh Iyer, (858) 967-6363, who represents the Office of Structural Materials for your project.

Inspected By:	Reyes,Danny	Quality Assurance Inspector
Reviewed By:	Brasel,Ron	QA Reviewer
